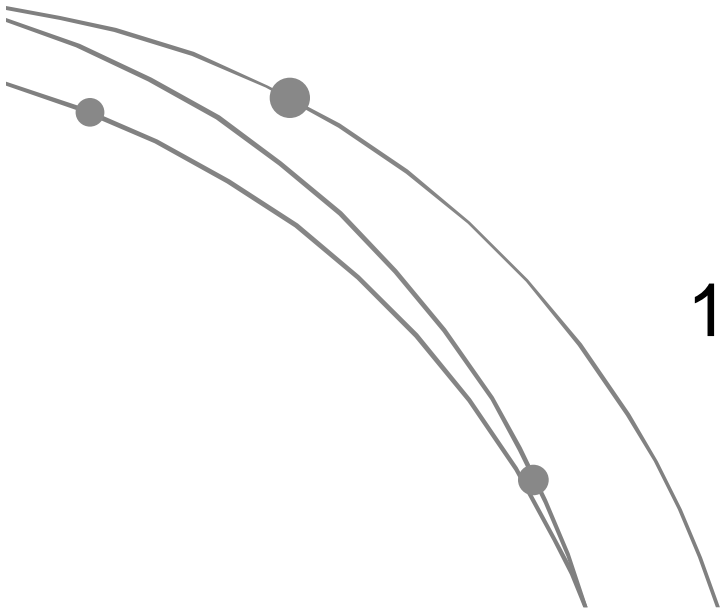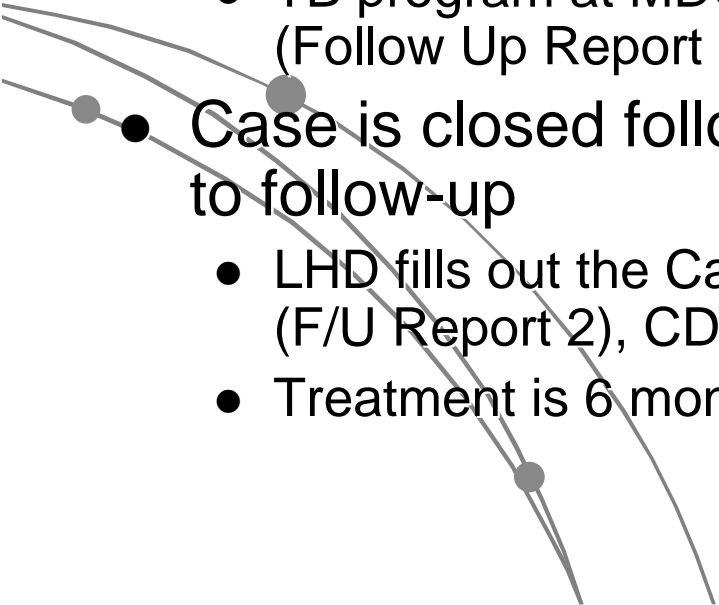# Incident Tuberculosis Reporting in the MDSS

Training slides

18 October 2007

Historical TB Workflow

- All case management and contact follow-up occurs at the local level
- LHD is notified of suspected or confirmed case of TB
  - Fills out RVCT and sends hard copy to MDCH (Report of Verified Case of TB, CDC 72.9A)
- Isolate is confirmed and susceptibility is tested at MDCH
  - TB program at MDCH fills out Initial Drug Susceptibility Report (Follow Up Report 1 (F/U Report 1), CDC 72.9B)
- Case is closed following completion of treatment or loss to follow-up
  - LHD fills out the Case Completion Report (Follow Up Report 2 (F/U Report 2), CDC 72.9C) and sends hard copy to MDCH
  - Treatment is 6 months or longer

Future Work Flow

- Upon notification of a suspect or confirmed case of active TB:
  - LHD enters the case into the MDSS under the reportable condition: "Tuberculosis" and leaves the Investigation Status as "New"
    - *LHDs should be aware that TB referrals , like other diseases, can also enter the MDSS through electronic lab report (ELR), healthcare provider (HCP) entry, or cross-jurisdictional LHD entry*
  - LHD completes the case detail information for pages 1-4 and changes the Investigation Status to "Active" when complete to indicate the case is ready for review by MDCH
  - Following review, MDCH will:
    - Mark "No" for the completion questions for F/U Report 1 and F/U Report 2
    - Mark the case "Completed" for notification to CDC
      - *The case can't be left open until follow-up is complete because CDC won't be notified unless the case is marked "Completed"*

This document contains interactive form fields.   ☐ Highlight fields

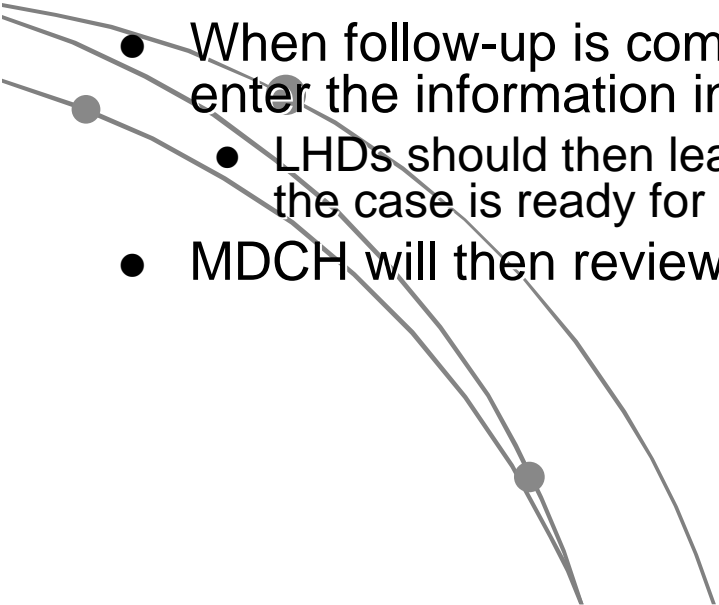| Activate Form | Submit Form | Cancel Form | Case Definitions |

Report of Suspect/Verified Case of Tuberculosis (RVCT)
Michigan Department of Community Health
Communicable Disease Division

Investigation Information

Investigation ID	State TB Case No (State Use Only)	Part of an outbreak? ○ Yes ○ No ○ Unknown	Outbreak Name	Referral Date mm/dd/yyyy

Investigation Status ○ New ○ Active ○ Completed ○ Superceded ○ Cancelled		Case Status ○ Confirmed ○ Not a Case ○ Probable ○ Suspect ○ Unknown

Patient Status ○ Inpatient ○ Outpatient ○ Died	Patient Status Date mm/dd/yyyy	Diagnosis Date mm/dd/yyyy	Onset Date mm/dd/yyyy

Patient Information

Patient ID	First	Last	Middle

Street Address

City	County	State	Zip

1 of 9

Future Work Flow (2)

- When drug susceptibility information is available, MDCH will re-open the case to enter information into F/U Report 1. MDCH will then close the case.
  - Nearly all of drug susceptibility testing is done at BOL
  - LHDs will be notified of drug susceptibility results by fax
- If the isolate is determined to be part of a cluster, MDCH will change re-open the case, change the "Outbreak Y/N" field to "Yes" and add the name of the cluster to the "Outbreak Name" field
  - The MDCH TB will continue to distribute the cluster reports via paper
- When follow-up is completed, the LHD should re-open the case and enter the information into F/U Report 2.
  - LHDs should then leave the Investigation Status as "Active" to indicate the case is ready for review by MDCH.
- MDCH will then review and close the case finally.

| Case ID | First Name | Last Name | Report of Suspect/Verified Case of Tuberculosis (RVCT) | Page 5 |

Follow Up

Drug Susceptibility Report Comple
○ *Yes* ○ *No* ○ *Unknown*

Was Drug Susceptibility Testing Do

○ *No* ○ *Yes* ○ *Unknown*

Susceptiblity Results:

ISONIAZID

RIFAMPIN

PYRAZINAMIDE

ETHAMBUTOL

RIFABUTIN

ETHIONAMIDE

STREPTOMYCIN

AMIKACIN

Follow Up Report -- 2: Case Completion Report

Case Completion Report Completed?
○ *Yes* ○ *No* ○ *Unknown*

Sputum Culture Conversion Documented	**If Yes, Date Specimen Collected on First Consistently Negative Culture** mm/dd/yyyy
○ *No* ○ *Yes* ○ *Unknown*	

If No, Reason For Not Documenting Sputum Culture Conversion
○ *Clinically improved: No follow-up sputum despite induction*   ○ *No follow-up sputum collected*   ○ *No initial sputum result or none collected*
○ *Died*   ○ *Patient lost*   ○ *Patient refused*
○ *Other* _____   ○ *Unknown*

U.S.-Mexico Binational Status
○ *Binational TB Case*   ○ *Not a binational TB case*   ○ *Unknown*

If a binational TB case, reason why
(select all that apply)
☐ *Diagnositic/Clinical/Treatment Information Exchange*   ☐ *Contacts*   ☐ *Laboratory/Radiologic Testing*

Did the patient move during TB therapy	**If Yes, moved to where** (select all that apply)
○ *No* ○ *Yes* ○ *Unknown*	☐ *In state, out of jurisdiction* ☐ *Out of state* ☐ *Out of the U.S.*

If moved in state, out of jurisdiction, enter county #1 ▾	**If moved in state, out of jurisdiction, enter county #2** ▾

If moved out of state, enter state #1 ▾	**If moved out of state, enter state #2** ▾	**If moved out of the U.S., enter country #1** ▾
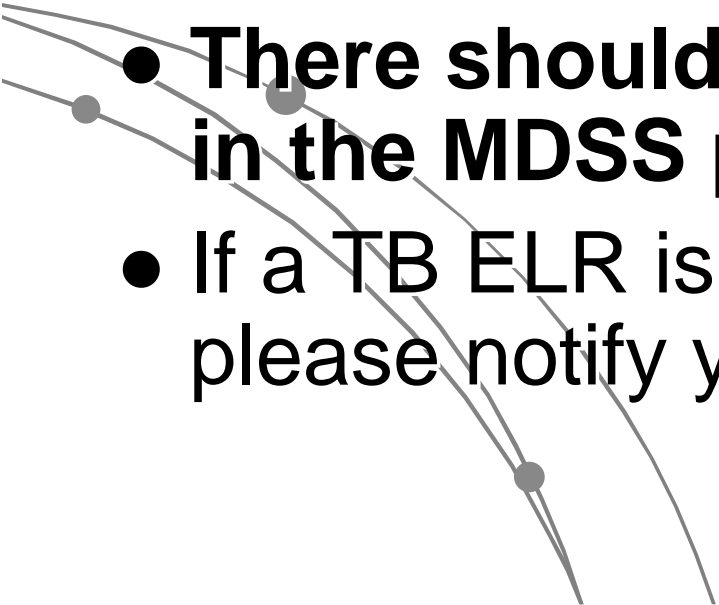
| **If moved out of the U.S., enter country #2**	**Date Therapy Stopped** mm/dd/yyyy

De-duplication Policy

- Proper de-duplication of incoming TB ELRs is very important
- The Pending Work Queue can be challenging because users can't tell if it is a TB lab until the end of de-duplication
- **There should be only one investigation in the MDSS per case of TB**
- If a TB ELR is not merged correctly, please notify your Regional Epidemiologist

A Challenge:
Cases managed by Detroit City instead of Wayne County

- Detroit City has its own CDC funded TB program
- Unlike traditional CDs, cases who reside in the listed cities are managed by Detroit City's TB program (not Wayne County):
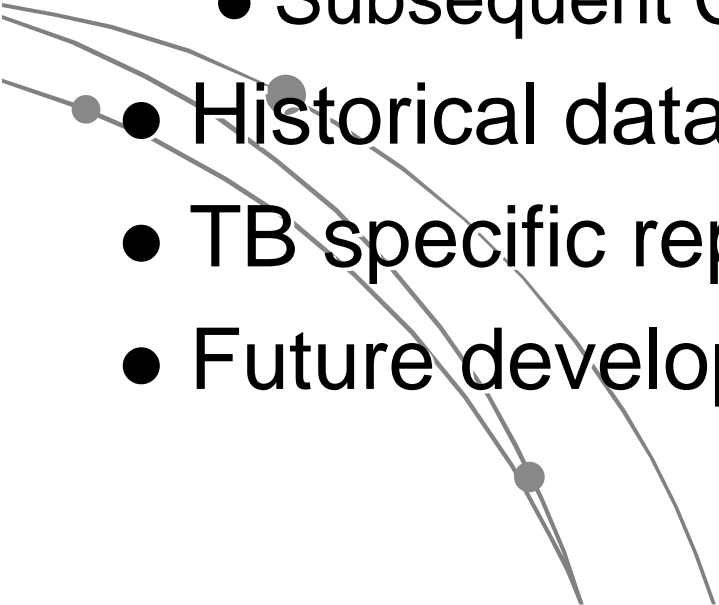
- Hamtramck
- Highland Park
- Harper Woods
- Grosse Point
- Grosse Park
- Grosse Shores
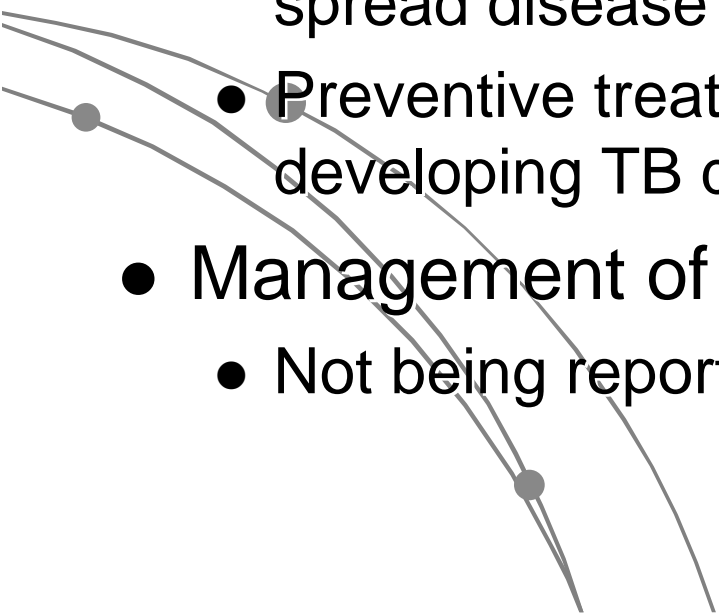- Grosse Woods
- East Detroit
- East Pointe
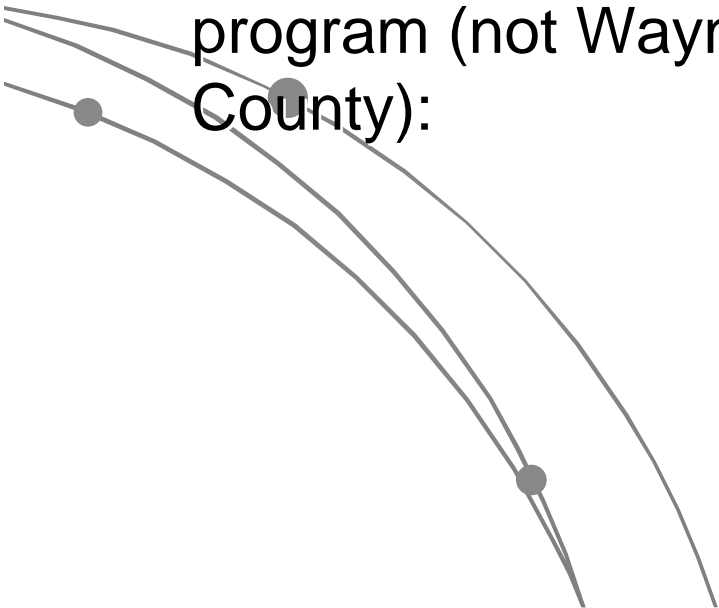
Managing Detroit City's
TB Jurisdiction

- If Detroit receives notification of a case from these cities:
  - The case should be entered into the MDSS with Detroit City as the only address field
    - If there is a previously existing (non-TB) case for this person, merge the person and create a new case for the TB report
    - If there is a previously existing TB case, merge both the person and the case and follow-up as appropriate
  - The actual address should be entered into the Case Notes HTML Tab with a note about the jurisdictional issue
- If a case is already in the MDSS and needs to be moved:
  - If an LHD identifies a case that needs to be moved, please contact the MDCH TB Program
  - Because of a quirk with managing addresses in the Address History tab, MDCH will need to move the case to Detroit City.
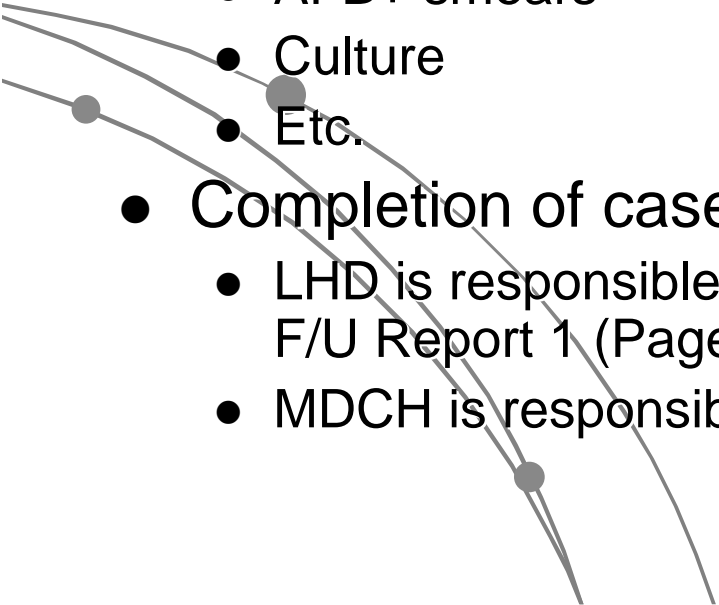
Expected Questions:
Not in this release

- Prolonged case management is not tracked in the MDSS at this time:
  - Complete contact tracing data
  - Directly Observed Therapy (DOT) data
  - Subsequent CXR results
- Historical data from TIMS not uploaded yet
- TB specific reports not incorporated yet
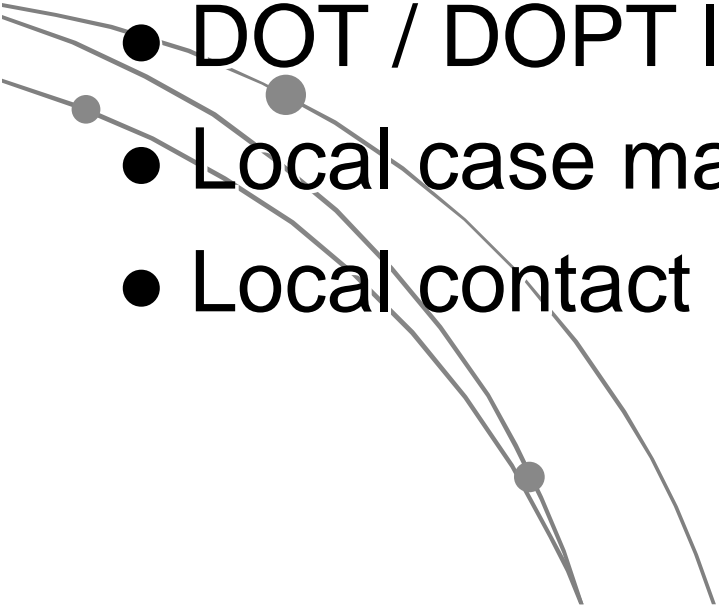- Future development in 2008?

Expected Questions:
Latent TB Infection (LTBI)

- Patients with LTBI
  - Positive skin test but not active disease (normal x-ray and no clinical signs)
  - Not considered infective
  - Without preventive treatment, can become ill and spread disease
  - Preventive treatment greatly reduces the risk of developing TB disease
- Management of LTBI
  - Not being reported into MDSS at this time

Expected Questions:
Policy

- All incident TB cases should be reported to MDCH via MDSS beginning January 1st, 2008
- Point at which to report: Any suspect TB case should be entered into the MDSS
  - HCP report
  - Positive skin test PLUS abnormal X-ray
  - AFB+ smears
  - Culture
  - Etc.
- Completion of cases:
  - LHD is responsible for filling out all of case detail form EXCEPT F/U Report 1 (Page 5)
  - MDCH is responsible for marking the case completed

Other TB forms / reports:
Not Changing

- Inter-jurisdictional Notifications
- TB Incident Alert Form
- DOT Patient Registration and Update Form
- DOT / DOPT logs
- Local case management forms
- Local contact investigation forms

More Information?

Contact Your Regional Epidemiologist

- OR-

The MDCH TB Program at 517-335-8165

- OR-

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MDSS Information Available on the Web

http://www.michigan.gov/mdss